JUN/FY06

FORT MISSOULA

Montana

Army Defense Environmental Restoration Program Installation Action Plan

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Statement of Purpose

The purpose of the Installation Action Plan (IAP) is to outline the total multi-year Military Munitions Response Program (MMRP) for an installation. The plan identifies environmental cleanup requirements at each site or area of concern, and proposes a comprehensive, installation-wide approach, with associated costs and schedules, to conduct investigations and necessary remedial actions.

In an effort to coordinate planning information between the US Army Environmental Center (USAEC), Montana Army National Guard, National Guard Bureau (NGB), executing agencies, regulatory agencies, and the public, an IAP was completed. The IAP is used to track requirements, schedules, and tentative budgets for all major Army installation cleanup programs.

All site-specific funding and schedule information has been prepared according to projected overall Army funding levels and is, therefore, subject to change.

The following agencies contributed to the formulation and completion of this Installation Action Plan:

Engineering and Environment, Inc. (EEI) for USAEC Montana Army National Guard (MTARNG) USAEC

Acronyms & Abbreviations

AEDB-R Army Environmental Database, Restoration

BMTA Blue Mountain Training Area

CERCLA Comprehensive Environmental Response Compensation and Liability Act

(1980)

COC Contaminants of Concern

CTC Cost-to-Complete

CTT Closing, Transferring and Transferred ranges

DA Department of Army DD Decision Document

DMM Discarded Military Munitions

EOD Explosive OrdnanceFS Feasibility StudyFY Fiscal Year

GIS Geographic Information System

IAP Installation Action Plan
IRA Interim Remedial Action

IRP Installation Restoration Program

K \$1,000

KD Known Distance

LTM Long-term Management MC Munitions Constituents

MMRP Military Munition Response ProgramMTNGB Montana National Guard Bureau

MTDEQ Montana Department of Environmental Quality

NE Not Evaluated
NFA No Further Action
NGB National Guard Bureau
NPL National Priorities List

OU Operable Unit

OMS Organizational Maintenance Shop

PA Preliminary Assessment

PY prior year

RA Remedial Action

RAB Restoration Advisory Board RA(O) Remedial Action - Operation

RC Response Complete

RCRA Resource Conservation and Recovery Act

RD Remedial Design REM Removal Action

RI Remedial Investigation
RIP Remedy in Place
ROD Record of Decision

ROTC Reserve Officer Training Corps

SI Site Inspection

SSI Site Screening Inspection

Acronyms & Abbreviations

TAPP Technical Assistance for Public Participation

TRC Technical Review Committee

USAEC United States Army Environmental Center

USEPA (United States) Environmental Protection Agency

US Forest Service (USFS)
UXO
Unexploded Ordnance

WWI World War I WWII World War II

yr year

Installation Information

Installation Locale: Fort Missoula (46 degrees 40 minutes N latitude and 114 degrees 30 minutes W longitude) is located approximately two miles southwest of Missoula, Missoula County Montana. Fort Missoula lies in the Missoula Valley which covers an area of approximately 35 square miles. The valley is bordered to the north by the Rattlesnake Mountains, to the east by the Sapphire Mountains and to the south by the Bitterroot Mountains. The approximately 50 acre installation currently consists of six parcels. Although the parcels are leased to different tenants, the US Army is the current owner. The westernmost tract comprises two contiguous parcels totaling 17 acres. The Army leased both parcels to the MTARNG from the 1970's until 1988, when the southern parcel was eliminated from the lease. Parcel No. 2 has the US Forest Service (USFS), Army Reserve and Navy Reserve as tenants. Parcels Nos. 3-5 remain under direct control of the Army. Parcel No. 3 is a cemetery and 5 is the location of an electrical substation.

Fort Missoula is included on the National Register of Historic Places and contains the Historic Museum at Fort Missoula established in 1975. The county-owned museum includes 12 historic structures and over 15,000 objects and lies on approximately 32 acres.

Installation Mission: The MTARNG mission is to provide units and personnel to the state and nation in three roles, federal, state and community. The overall mission of the MTARNG is to train and equip soldiers to meet readiness standards and conduct wartime and peacetime missions; provide a "citizen-soldier" military model for the Partnership for Peace Program; provide ready forces for state missions; and participate in community activities that add value to Montana. The MTARNG mission includes responding to wildfires and helping communities during floods, tornadoes, hurricanes, snowstorms or other emergency situations. In times of civil unrest, the MTARNG is also ready to respond, if needed.

Lead Organization: National Guard Bureau

Lead Executing Agency:

Montana Department of Military Affairs, Environmental Office

Regulatory Participation

State: Montana Department of Environmental Quality (MTDEQ)

National Priorities List (NPL) Status: Not on NPL

Installation Restoration Advisory Board (RAB)/Technical Review Committee (TRC)/Technical Assistance for Public Participation (TAPP) Status: No RAB has been established.

Installation Information

Installation Program Summaries

MMRP

Primary Contaminants of Concern: propellants, metals Affected Media of Concern: soils, surface water Estimated Date for Response Complete (RC): 2022

Funding to Date (up to FY05): \$ 0K Current Year Funding (FY06): \$ 144K Cost-to-Complete (FY07+): \$26,178K

Cleanup Program Summary

Installation Historic Activity

Fort Missoula was originally constructed in 1877 as an open installation with no walls. Its original mission was to protect settlers from the local Indians. The installation originally covered 7921 acres in all directions from the current boundaries. In 1888 the 25th Infantry Regiment was stationed at the installation and in 1898 the installation was abandoned. It reopened in 1904, was remodeled and used extensively during WWI as a training center. After being abandoned in 1921, the installation was designated as the Northwest Regional Headquarters for the Civilian Conservation Corps in 1933, and turned over to the Department of Immigration in 1941. The installation was used as a detention center for both Italians and Japanese during WWII.

After being used as a prison camp from 1945-1947 military operations began winding down, and portions of the installation's buildings and lands were conveyed to various interests. Fort Missoula is currently a sub-installation of Fort Carson, Colorado. The MTARNG leases the land and the County of Missoula, University of Montana, and the Western Mental Health Center were conveyed lands. The Army currently controls approximately 50 acres. Parts of this land are being sought by the Northern Rockies Heritage Center and the USFS.

The Montana Army National Guard's official presence at Fort Missoula began in April of 1968 upon being granted a License (NO. DACA67-3-68-245) for Parcel No.1 (13.71 acres) for "National Guard Purposes." Parcel No. 1 included buildings numbered: T-310, T-312, T-316, T-325, T-327, T-328, T-329, T-330, T-334, T-350 and T-351. This License was extended in 1973 for five years.

In October of 1977 Department of Army (DA) issued a Supplemental Agreement to make the following changes in the original License: "Buildings No. T-310, T-312, T-316 and T-329 be deleted and Building T-350 and T-351 be modified to read P-350 and P-351 ..."

In March of 1978 the License was extended to 8 April, 1983 by the Department of the Army.

In March of 1983, DA amended and extended the License. The License granted the right to use Buildings Nos. T-325, T-327, T-328, T-329, T-330, T-334, P-350 and P-351 together with land area, utilities, facilities and ingress and egress over Post roads.

In April of 1988, Department of Army amended and extended the License and added 6.82 acres and deleted 3.36 acres for a total of 17.71 acres under License. Amendment No. 7 granted to the State of Montana, for National Guard Purposes, "the use of Buildings Nos. t-310, T-312, T-316, T-325, T-327, T-328, T-329, T-330, T-334, T-350 and T-351, approximately 17.07 acres of land with utilities, together with ingress and egress over Post roads, ..."

In November of 1988, Amendment No. 8 deleted Building No. 329 which was demolished.

The term of the License became Indefinite beginning 20 November 1989.

Cleanup Program Summary

In February of 1990, DA issued License No. DACA67-3-90-54 to the State of Montana "...a license for an indefinite term, commencing on 20 November 1989, but revocable at will by the Secretary of the Army, to use and occupy for year-round training and support of the Montana Army National Guard...".

In June of 1994, DA incorporated Supplemental Agreement No. 1 to the DA License. This Supplemental Agreement added Building OMS #2 to the Joint Inventory and Condition Report.

The history of live-fire training at Fort Missoula by the MTARNG is "sketchy." Based on findings published in a 1996 Corps of Engineers Draft Archives Search Report for Fort Missoula, there is some evidence that elements of the MTARNG conducted live-fire operations with "dud-producing" weapons at the Blue Mountain Training Area but there is little evidence to support that they trained at Pattee Canyon or McCauley Butte. There is evidence that elements of the MTARNG conducted live-fire training with small arms and crew-served weapons (using subcaliber ammunition) at the Blue Mountain Training Area (BMTA)

Parcel No. 1 amounts to a cantonment area of 13.71 acres. It is unlikely that battalion-level training involving live-fire or maneuver training could have occurred on such a limited area. It is more probable that platoon and company-level assembly occurred on week-end drill and that the OMS supported maintenance activities of elements of the 163rd Armored Brigade.

MMRP

Prior Year Progress: Preliminary Assessment (PA) completed at all sites.

Future Plan of Action: Site Inspections will begin in FY06 for FTMSL-001-R-01, FTMSL-002-R-01 and FTMSL-003-R-01. The installation plans to complete Remedial Investigations/ Feasibility Studies (RI/FS) by 2010 and execute follow on phases/actions as required in the individual site cleanup strategies.

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Military Munitions Response Program

MMRP Summary

Total AEDB-R MMRP Sites / AEDB-R Sites with Response Complete: 5/0

AEDB-R Site Types

4 small arms range 1 UXO

Most Widespread Contaminants of Concern: Metals, propellants

Media of Concern: Soil, Surface water

Completed REM/IRA/RA: None

Total MMRP Funding

 Prior Years (up to FY05):
 \$ 0K

 Current Year (FY06):
 \$ 144K

 Future Requirements (FY07+):
 \$ 26,178K

 Total:
 \$ 26,322K

Duration of MMRP

Year of MMRP Inception: 2003 Year of MMRP RIP/RC: 2022

Year of MMRP Completion Including LTM: 2047

MMRP Contamination Assessment

MMRP Contamination Assessment Overview

A potential unexploded ordinance (UXO) area was identified by personnel interviewed during an investigation conducted in 1994. This area lies southwest of building T-330, in Parcel No. 6 which was part of the MTARNG lease until 1988. This UXO area is suspected of having been used as a landfill from 1956 until 1980. It was partially excavated in the 1970's by war artifact collectors and a variety of bottles and Calvary artifacts were discovered. Additionally, four live artillery rounds were recovered and disposed of (a witness account states one round – not four - was recovered from this landfill, COE Archive Search Report 1996). Currently, this area is overgrown and shows no signs of stressed vegetation. The area is not regularly used and past construction of the sewer line through the area did not encounter UXO.

MMRP Cleanup Exit Strategy

The installation plans to complete Remedial Investigations/ Feasibility Studies (RI/FS) by 2010 and execute follow on phases/actions as required in the individual site cleanup strategies.

Previous Studies

1990

 Water Quality Bureau, Montana Department of Health and Environmental Sciences, Initial Investigation for Perchloroethylene Contamination in the Missoula Aquifer; Preliminary Report, September

1991

• US Army Environmental Hygiene Agency, Geological Study No. 38-26-KC13-91, July

1992

Resource Applications, Inc. Site Screening Inspection (SSI)

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Military Munitions Response Program Site Descriptions

FTMSL-001-R-01 **Blue Mountain Training Area**

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SITE DESCRIPTION

This area was located southwest of the present Fort Missoula property. The Army Reserve used Blue Mountain Training Area (BMTA) beginning in 1947. Small arms, howitzers, and 3.5-inch rockets were fired on this 1,445.93-acre tract of land. The location of the firing points and direction of fire is unknown. This area was utilized as a training area through 1992, but is now owned by private individuals. The area is a popular recreation area with residential housing built on private in-holdings. No known UXO responses have been conducted on site.

An Archives Search Report (ASR) was completed by the St. Louis District of the Corps of Engineers in October of 1996. This ASR contains a detailed account of the use of the BMTA. The following narrative is excerpted from the ASR:

REGULATORY DRIVER: CERCLA

STATUS

RAC SCORE: 1-HIGH

CONTAMINANTS OF CONCERN:

Metals, Propellants

MEDIA OF CONCERN: Soil,

Surface water

<u>Phases</u>	Start	End
PA	200306	200312
SI	200601	200712
RI/FS	200810	200909
RD	201510	201609
RA(C)	201610	201709
LTM	201710	204709

RC DATE: 201709

"In 1942, the Missoula Chamber of Commerce purchased a 4,877.84 acre tract of land across the Bitterroot River from Ft. Missoula to be used as a target range for the troops stationed at Ft. Missoula (Seattle District, Corps of Engineers 1967). The Army Reserve began using this area, the BMTA as a training site in 1947. An Executive Order from 1952, transferred the land to the Ft. Missoula District of the Lolo National Forest, subject to the unhampered use by the Department of the Army for purposes of National Defense (US Army Engineer District, Seattle 1990). A letter from 1959, states that regular Army personnel had never fired a shot on the range (County of Missoula 1959). In 1967, training available to Reserve Components at BMTA included the ordnance-related activities of small arms firing with .30 caliber, .50 caliber, and 7.62 mm weapons, firing some crew-served weapons including the 3.5 inc rocket launcher; hand grenade practice, and demolitions. Also available were other types of training such as bivouacs, parachute drops, fortifications, and driver training. Buffer zones related to range safety requirements precluded using an area proposed for recreation near where the Army Reserve trained. A letter from the Seattle District, Corps of Engineers relates that the demolitions exercises frequently dropped rock fragments within the proposed recreation area, and state that "it is also probable that there may be isolated instances of duds in the area." Units using the BMTA in 1967 consisted of those from the Montana ANG, including Batteries from the Second Howitzer Battalion of the 190th Artillery, US Army Reserve, Marine Corps Reserve, Naval Reserve, and ROTC Units of the University of Montana.

FTMSL-001-R-01 Blue Mountain Training Area (Page 2 of 4)

Army Special Forces troops from Ft. Bragg planned to train at the BMTA in 1967 (Seattle District, Corps of Engineers 1967)."

"The 1968 regulations for the BMTA and Known Distance (KD) Range showed area "A" as a live fire range using the following weapons: Rifle M1, Automatic Rifle, Pistol, Submachine Gun, and Carbine. Prior to leaving the range when live ammunition had been fired, all weapons, cartridge belts, and personnel had to be inspected by a unit officer to insure that trainees turned in all ammunitions and the weapons were clear. The Officer in Charge insured that the trainees did not abandon any live ammunitions and that the police all expended brass. Types and calibers of weapons authorized to be fired at the BMTA were as follows:

Individual:

- -Rifle, semiautomatic, cal. .30, 7.62mm and 5.56mm
- -Rifle, automatic, cal. .30, 7.62mm and 5.56mm
- -Carbine, semiautomatic, cal. .30
- -Pistol, cal. .45, .38, and .22
- -Gun, submachine, cal. .45

Crew Served:

- -Gun, machine, cal. .30 and 7.62mm
- -Gun, machine, cal. .50
- -Launcher, rocket 3.5 in. (practice ammunition only)

Other:

- -Hand Grenades (live grenades could be thrown from regulation type protective bunkers located 150M NE of the Pistol Range.)
- -Demolitions: Use area 100M southwest of pistol target area. Firing bunker located 100M northwest of pistol area.
- -40MM Grenade Launcher M79, same area as demolitions

(State of Montana, Office of the Adjutant General 1968).

In August 1981, the Second Howitzer Battery of the Montana ANG requested the use of the BMTA to familiarize crews with weapons systems and conduct crew drills using a subcaliber device. They requested the use of the submachine gun range, rifle zero range, rifle KD range, pistol range, 7.63 machine gun range, M31 artillery trainer range, and appropriate target frames (Commander Howitzer Battery 2/163rd AC 1981).

A 1982 letter from Headquarters 379th Engineering Battalion at Ft. Missoula states that the area of intensive military use at BMTA was approximately 1000 acres of the total area which comprised almost 5000 acres (Headquarters 379th Engineer Battalion 1982).

FTMSL-001-R-01 Blue Mountain Training Area

(Page 3 of 4)

The 1983 Installation Assessment Report on Ft. Missoula and the BMTA shows an M16-M60 range, a pistol range, an M203 range, a grenade range, a helipad, decontamination area, demolition training area, an impact area related to the ranges, and several other training areas such as a confidence course. Training operations conducted at BMTA included range firing, airborne operations, tactical maneuvers including subcaliber artillery. and engineer operations. The report indicates that the U.S. Army Reserve and Montana ANG troops reportedly used a small demolition area on BMTA on an infrequent basis for training in handling and detonating explosives. The 1983 Installation Assessment Report also claims that no demilitarization activities other than the destruction of duds and explosive items are reportedly conducted at Ft. Missoula or at BMTA. The eastern portion of the training area held the firing ranges, including a KD range, pistol range, M-203 range, and hand grenade range. Troops firing weapons at the KD range directed their fire into a butte backstop. Troops conducted explosives demolition at the EOD range at the BMTA. The Installation Assessment Report states that annual amounts and types of explosives used in training, although unknown, were believed to be small quantities. The report states that the primary mission of the BMTA was to serve as a training site for regular, reserve, and National Guard units (Environmental Science and Engineering, Inc. 1983).

The BMTA closed in the summer of 1984 due to range safety inconsistencies with live fire exercises. The Chief of Staff of the Montana ANG recommended that when the range reopened the activities listed in the controlled firing area for Federal Aviation Administration purposes include firing of small arms, 7.62mm machine gun, 90mm recoilless subcaliber device (7.62mm tracer), 40mm practice round (B-519), 155mm subcaliber device M31 (14.5mm), Light Anti-tank Weapon (LAW) subcaliber device M73 (35mm), tank subcaliber (5.56mm and 22 caliber) and demolition training limited to ¼ blocks. The Chief of Staff also recommends time of use to be approximately 90 days per year from 0800-2100 local time on weekend days (US Army Support Detachment, Salt Lake 1984). However, the potential for duds and the problem of civilian recreation use in the area resulted in a proposal to exclude using the 14.5mm field artillery trainer when the BMTA reopened. The Montana Adjutant General's Office showed particular concern with the proposal, since the Howitzer Battery depended exclusively upon the BMTA for its local training needs (Headquarters Fort Douglas 1984).

In 1984 the State of Montana Department of Military Affairs issued a report listing past average usage of the BMTA per year by each unit, as shown here:

Howitzer Battery: 1063 Engineer Co: Trp. G, 2/163d ACR: M31A Training, Weapons Qualification Weapons Qualification (M-16, .45 Cal)

Tank Tables I-IV, M-16, .45 caliber and .45 caliber submachine gun qualification, Scout tactical training,

Pneumatic Mortar.

FTMSL-001-R-01 Blue Mountain Training Area (Page 4 of 4)

To meet projected future needs at the BMTA, the Department of Military Affairs created the following range and tactical training area requirements summary:

- -Weapons qualification/familiarization range requirements include M-16, M-60, .45 Cal pistol, .45 cal submachine gun, M203 and M2.
- -Tank Tables I-IV (subcaliber) and VIIC using the 7.62 Brewster Device, plastic or limited range ammunition as it becomes available.
- -M31A field artillery trainer, 14.5 mm.
- -Maneuver area for armored cavalry scouts and Howitzer Battery vehicles. Normally only wheeled vehicles will maneuver off roads.
- -Areas for a tank crew qualification course (dry) and driver's training.
- -Troop sized Command Post Exercises, Field Training Exercises and Bivouac areas (Department of Military Affairs 1984).

The Army reopened the BMTA for military use in January 1985, primarily as a local training area for U.S. Army Reserve components. Various military units primarily used the range area for M-1, M-14 and M-16 rifles, but Montana ANG regulations authorized some of the range areas to be used for the .50 caliber machine gun, 3.5 inch rocket launcher, hand grenades, demolitions, and M-79 40-millimeter grenade launcher. The BMTA also contained a simulated mine field and booby-trap are, a decontamination training area, and other training activity areas such as a compass course. Authorized weapons listed for the BMTA included .22 caliber, .38 caliber, and .45 caliber pistol and revolver, 5.56mm M-16 rifle, .45 caliber submachine gun, M-60 5.56mm machine gun, and M-79 40mm Grenade Launcher (practice) (Headquarters Fort Douglas 1985).

A 1992 Total Army Basing Study described the BMTA as having good suitability for infantry and ranger training, but considered other types of training as either marginal or unsuitable in this area. The firing ranges listed in the report include a Basic, 25 meter (zero) range with six lanes per range; a KD rifle range with six lanes per range; a machine gun range; a 10-meter range with four lanes per range; a field artillery simulator range for the M31, 14.5mm trainer with 20 lanes per range; and a demolition area (Total Army Basing Study 1992).

CLEANUP STRATEGY

An SI has not been identified for this site. An SI is recommended to include the following:

Create a Geographic Information Systems (GIS) based map of the area delineating firing points and targets. This information will be derived from archival search results and from surface reconnaissance of the site. A conceptual site model will be developed for the Blue Mountain Training Area. The conceptual site model will drive the remediation effort.

FTMSL-002-R-01 McCauley Butte Small Arms Ranges

SITE DESCRIPTION

This closed 17.93 acre range complex includes the McCauley Butte Pistol and Machine Gun Range and the McCauley Butte Rifle Range. The pistol and machine gun range was located west of the present Fort Missoula property. This site only includes the non-transferred portion of a much larger range area. A 1922 map shows the pistol and machine gun range near the center of Section 36. The target butt was shown lying perpendicular and adjacent to the Bitterroot River. The firing direction was from the northeast to the southeast. The rifle range was located northwest of the present Fort Missoula Property. In approximately 1893, a target range school was established for rifle marksmanship. The range's target area was located at the base of the bluff and extended to the northeast for approximately 800 yards. It appears that both ranges were used from 1893 to 1927.

STATUS

REGULATORY DRIVER: CERCLA

RAC SCORE: 5-NEGLIGIBLE

CONTAMINANTS OF CONCERN:

Metals

MEDIA OF CONCERN: Soil,

Surface water

<u>Phases</u>	Start	End
PA	200306	200312
SI	200601	200712
RI/FS	200910	201009
RD	201510	201609
RA(C)	201610	201709

RC DATE: 201709

The area is currently undeveloped. No UXO responses have occurred on site.

CLEANUP STRATEGY

An SI has not been identified for this site. An SI is recommended to include the following:

Create a GIS based map of the area delineating firing points and targets. This information will be derived from archival search results and from surface reconnaissance of the site. A conceptual site model will be developed for the Blue Mountain Training Area. The conceptual site model will drive the remediation effort.

FTMSL-003-R-01 McCauley Butte Small Arms Ranges-TD

SITE DESCRIPTION

This transferred 1,076.52-acre range complex includes a pistol and machine gun range and a rifle range. These ranges were used from 1893 to 1927. The pistol and machine gun range was located west of the present Fort Missoula property. A 1922 map shows the pistol and machine gun range near the center of Section 36. The target butt was shown lying perpendicular and adjacent to the Bitterroot River. The firing direction was from the northeast to the southeast. The rifle range was located northwest of the present Fort Missoula Property. In approximately 1893, a target range school was established for rifle marksmanship. The range's target area was located at the base of the bluff and extended to the northeast for approximately 800 yards. It is uncertain as to when the property was transferred. The property is currently owned by private individuals and is used as agricultural land with housing.

STATUS

REGULATORY DRIVER: CERCLA

RAC SCORE: 5-NEGLIGIBLE

CONTAMINANTS OF CONCERN:

Metals

MEDIA OF CONCERN: Soil,

Surface water

PHASES	Start	End
PA	200306	200312
SI	200810	200909
RI/FS	201611	201710
RD	201811	201910
RA(C)	202011	202210

RC DATE: 202210

CLEANUP STRATEGY

An SI has not been identified for this site. An SI is recommended to include the following:

Create a GIS based map of the area delineating firing points and targets. This information will be derived from archival search results and from surface reconnaissance of the site. A conceptual site model will be developed for the Blue Mountain Training Area. The conceptual site model will drive the remediation effort.

FTMSL-004-R-01 Pattee Canyon Rifle Range

SITE DESCRIPTION

This range, approximately 960 acres in size, was located east of the present Fort Missoula property. In 1925, the Pattee Canyon Rifle Range was constructed with a total of 15 targets. One of the targets utilized on this range was a 1,000-yard machine gun range. Information on the firing points and direction of fire was not available. The range was officially closed in 1945. Property transfer information was not available for the Pattee Canyon Rifle Range site. This area is within the Lolo National Forest.

No known UXO responses have been conducted at this site. This range is currently undeveloped.

CLEANUP STRATEGY

An SI has not been identified for this site. An SI is recommended to include the following:

STATUS

REGULATORY DRIVER: CERCLA

RAC SCORE: 5-NEGLIGIBLE

CONTAMINANTS OF CONCERN:

Metals

MEDIA OF CONCERN: Soil,

Surface water

<u>Phases</u>	Start	End
PA	200306	200312
SI	200810	200909
RI/FS	201611	201710
RD	201811	201910
RA(C)	202011	202210

RC DATE: 202210

Create a GIS based map of the area delineating firing points and targets. This information will be derived from archival search results and from surface reconnaissance of the site. A conceptual site model will be developed for the Blue Mountain Training Area. The conceptual site model will drive the remediation effort.

FTMSL-005-R-01 Pattee Canyon Small Arms Range

SITE DESCRIPTION

This range, approximately 1,040 acres in size, was located east of the present Fort Missoula property. According to previous assessments and maps, an artillery range was located just to the west of the Pattee Canyon Rifle Range and used for small arms training from 1925 through 1945. Information on the firing points and direction of fire was not available. Property transfer information was not available for the Pattee Canyon Small Arms Range. This area is now known as the Lolo National Forest. No UXO responses have been conducted at this site. This range is currently undeveloped.

CLEANUP STRATEGY

An SI has not been identified for this site. An SI is recommended to include the following:

Create a GIS based map of the area delineating

firing points and targets. This information will be derived from archival search results and from surface reconnaissance of the site. A conceptual site model will be developed for the Blue Mountain Training Area. The conceptual site model will drive the remediation effort.

STATUS

REGULATORY DRIVER: CERCLA

RAC SCORE: 5-NEGLIGIBLE

CONTAMINANTS OF CONCERN:

Metals

MEDIA OF CONCERN: Soil,

Surface water

<u>Phases</u>	Start	End
PA	200306	200312
SI	200810	200909
RI/FS	201611	201710
RD	201811	201910
RA(C)	202011	202210

RC DATE: 202210

MMRP Schedule

Initiation of MMRP: 2003

Past Phase Completion MilestonesNone

Projected ROD/DD Approval Dates: None

Projected Construction Completion: 2017

Schedule for Five Year Reviews: None

Estimated Completion Date of MMRP including LTM: 2047

FORT MISSOULA MMRP SCHEDULE

(Based on current funding constraints)

AEDB-R#	PHASE	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15+
FTMSL-001-R-01	RIFS									
	RD									201609
	RAC									201709
	LTM									204709
FTMSL-002-R-01	RIFS									
	RD									201609
	RAC									201709
FTMSL-003-R-01	SI									
	RIFS									201710
	RD									201910
	RAC									202210
FTMSL-004-R-01	SI									
	RIFS									201710
	RD									201910
	RAC									202210
FTMSL-005-R-01	SI									
	RIFS									201710
	RD									201910
	RAC									202210

MMRP Costs

Prior Years Funds

Total Funding up to FY04: \$0

FY05

Site Information Expenditures FY Total

\$0

Total Prior Year Funding: \$0

Current Year (FY06) Requirements

Site InformationExpendituresFY TotalSI\$144K\$144K

Total Funding FY06: \$144K

Total Future Requirements: \$26,178K

Total MMR Program Cost (from inception to completion of the IRP): \$26,322K

Community Involvement

Lack of outstanding cleanup issues or activities does not warrant establishment of a RAB.